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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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EXAMINER
EINSMANN, JULIET CAROLINE

ART UNIT	PAPER NUMBER
1634	13

DATE MAILED: 10/08/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/552,087	Applicant(s) BYRUM ET AL.	
	Examiner Juliet C Einsmann	Art Unit 1634	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *19 February 2002 and 15 July 2002* .

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *3-11* is/are pending in the application.

4a) Of the above claim(s) *4,8 and 11* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *3,5-7,9 and 10* is/are rejected.

7)☒ Claim(s) *3,5-7,9 and 10* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____ .

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

14)☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

a) ☐ The translation of the foreign language provisional application has been received.

15)☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) *8* .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other:

DETAILED ACTION

1. This action is written in response applicant's correspondence submitted 2/19/02 and 7/15/02, paper numbers 10 and 12. In paper number 10, claims 3, 5, and 6 were amended and claims 1 and 3. Claims 2-11 are pending. Applicant's amendments and arguments have been thoroughly reviewed, but are not persuasive for the reasons that follow. Any rejections not reiterated in this action have been withdrawn. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

2. With regard to Applicant's comments in paper number 12, the examiner hereby withdraws the notice of non-compliant response in the interest of facilitating the continuance of prosecution of this application.

Information Disclosure Statement

3. The signed copy of the 1449 filed 24 August 2001 (paper number 8) is enclosed herewith.

Election/Restrictions

4. Applicant's election with traverse of Group I, SEQ ID NO: 1, in Paper No. 10 is acknowledged. The traversal is on the ground(s) that the Patent Office has not proven that an undue burden would be imposed by the search and examination of the entire application, pointing out that the examiner did not address why it would be an undue burden to examine all of the claims with regard to a single nucleic acid sequence. However, this is not persuasive. Applicant's remarks imply that the only burden involved in examination of the restricted claims is the running of a sequence search. However, as pointed out in the original restriction requirement, each of the three groupings of claims is classified in a separate art area. This separate classification is prima facie evidence that the search and examination of the claims

would impose a burden on the examiner. Applicant's comments have provided no evidence that such a burden does not exist. Applicant asserts that the examiner did not address the burden associated with examining all of the claims, however, in paragraph number 4 of the previous office action the examiner explains why a serious burden exists. Further, it is noted that the examination of the claims for each of these inventions is unique for each type of claims. With regard to the anti-sense versus the sense orientation claims (groups I and II), as noted in the restriction requirement, the functionality of a nucleic acid molecule whether it is in the sense or anti-sense direction is distinct and unpredictable in light of one another. So, while they may be related in that they recite the same nucleic acid sequence

The requirement is still deemed proper and is therefore made FINAL.

Claim Objections

5. Claims 3, 5-7, 9, and 10 are objected to for containing non-elected subject matter. Amendment of the claims to reflect the election of SEQ ID NO: 1 is required.

Sequence Rules

6. This application appears to be in compliance with the sequence rules.

Claim Rejections - 35 USC § 112 2nd paragraph

7. The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

8. Claims 3, 5-7 and 9-10 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 3, 5, and 6 are indefinite over the recitation "wherein said structural nucleic acid molecule encodes a protein or fragment thereof selected from the group consisting of a Glycine max protein or fragment thereof in Table 1" because it is not clear what protein is being referred to with regard to elected SEQ ID NO: 1 in table 1. The first line of table 1 appears to correspond to SEQ ID NO: 1, and it gives a number of identifiers and a description of what appears to be a GenBank record that discloses an Arabidopsis thaliana protein. Table 1 does not appear to recite a Glycine max protein that is related to instant SEQ ID NO: 1. Thus, it is not clear to what protein this claim is referring.

All of the claims are indefinite because they appear to conflict as to the function of instant SEQ ID NO: 1, and the claimed invention is rendered unclear. Claim 3 and Table 1 appear to suggest that SEQ ID NO: 1 is a structural nucleic acid molecule encoding a protein, while claim 7 appears to suggest that SEQ ID NO: 1 is a promoter molecule. Clarification is required.

Claim Rejections - 35 USC § 101

9. 35 U.S.C. 101 reads as follows:

> Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

The pending claims have been reviewed in light of the Utility Examination Guidelines and Guidelines for Examination of Patent Applications under 35 U.S.C. 112, first paragraph,

"Written Description" Requirement, Federal Register, Vol. 66, No. 4, pages 1092-1111, Friday, January 5, 2001.

Claims 3, 5-7, and 9-10 are rejected under 35 U.S.C. § 101 because the claimed invention lacks patentable utility due to its not being supported by a specific, substantial, and credible utility or, in the alternative, a well-established utility.

The claimed subject matter is not supported by a specific, substantial, and credible utility because the disclosed uses are generally applicable to broad classes of this subject matter. In addition, further characterization of the claimed subject matter would be required to identify or reasonably confirm a "real world" use.

The elected claims are drawn to plant host cells and transgenic plants that comprise construct having a promoter linked to a structural nucleic acid molecule that encodes a Glycine max protein or a fragment thereof and a 3' non-translated sequence that functions in said cell to cause termination of transcription (Claims 3, 5, and 6) as well as host cells and transgenic plants comprising these constructs. These claims are unclear as to precisely what protein is being referred to in the claims, but they are being treated herein as if they are referring to a protein encoded by SEQ ID NO: 1 (the elected invention). The remaining claims (7, 9, and 10) are drawn to transformed plants having a nucleic acid molecule which comprises a promoter that is SEQ ID NO: 1, or the complement thereof, a structure nucleic acid encoding a polypeptide, and a 3' non-translated sequence.

A well-established utility is defined as a specific, substantial and credible utility which is well known, immediately apparent or implied by the specification's disclosure of the properties of a material, alone or taken with the knowledge of one skilled in the art. The instant host cells

and transgenic plants do not have a well established utility because the art does not teach any utility for the instantly host cells and transgenic plants that is specific, substantial, and credible.

The specification discloses a number of general utilities for the nucleic acids disclosed herein. For example, the specification generally discloses that these nucleic acids are useful in genetic mapping studies (p. 35), physical mapping (p. 43), contig mapping (p. 46), comparative mapping (p. 49-56), the identification of polymorphisms (p. 49-56), monitoring expression (p. 56), locating regions of identity by descent between individuals (p. 58), isolating clones (p. 59), microarray based methods (p. 60), direct site mutagenesis (p. 60), transformation (p. 62-80), in cosuppression (p. 80), to reduce gene function (p. 82), and as antibodies (p. 83). None of these asserted utilities are specific because the disclosed uses of the nucleic acids are generally applicable to any nucleic acid and therefore are not particular to the nucleic acid sequences being claimed.

Furthermore, the instant claims are not drawn to nucleic acids, they are drawn to particular constructs, and the language of the claims directs one to possible utilities for the claimed invention. For example, claims 3, 5 and 6, are drawn to transformed plant cells and transgenic plants that have a construct which contains instant SEQ ID NO: 1 as "structural nucleic acid" that encodes a Glycine max protein. Thus, these claims suggest that SEQ ID NO: 1 is being included in the host cells and transgenic plants of claim 3, 5, and 6 for its functionality as a "structural gene." This functionality, i.e. the ability to encode a polypeptide is not specific to SEQ ID NO: 1, but instead is applicable to any polynucleotide. Nucleic acids, by their nature, encode polypeptides.

The instant specification herein discusses transformation of cells and plants in general (p. 62-80), but does not discuss these methodologies with regard to SEQ ID NO: 1 in particular. The specification in table 1 sets for the that the protein encoded by instant SEQ ID NO: 1 has 50% identity with a putative POL3 protein from Arabidopsis, but the specification does not assert a utility for SEQ ID NO: 1 or the protein encoded by SEQ ID NO: 1 based on this homology. The fact that SEQ ID NO: 1 encodes a polypeptide that has homology to a "putative" protein suggests that the functionality of the Arabidopsis protein has not been confirmed. Thus, further experimentation would be required to reasonably confirm the identity of the protein both for Arabidopsis and for Glycine max proteins. Beyond that, further experimentation would still be required to establish a real world utility for such a protein. Further still, the claim encompasses cells and plants that comprise constructs that encode a fragment of the protein encoded by SEQ ID NO: 1, but the specification provides no guidance as to which portions of the protein comprising SEQ ID NO: 1 would retain whatever functionality and utility that is possessed by the polypeptide encoded by SEQ ID NO: 1.

Claims 7, 9, and 10, are drawn to transformed plant cells and transgenic plants that have a construct which contains instant SEQ ID NO: 1 or its complement as "an exogenous promoter region" that functions in a plant cell to cause the production of an mRNA molecule. Thus, these claims suggest that SEQ ID NO: 1 is being included in the host cells and transgenic plants of claim 3, 5, and 6 for its functionality as a "promoter." This is not considered a substantial utility because further experimentation would be required to determine which portion of SEQ ID NO: 1, or its complement, or fragments of either would function as a promoter as required by the claims. The specification does not provide any guidance as to the use of SEQ ID NO: 1, its

complement or fragments thereof as promoters. In order to use the claimed invention, one would first have to confirm that either SEQ ID NO: 1 or its complement is in fact a promoter, then determine which fragments are also promoters. One would have to determine the type of promotion conferred by SEQ ID NO: 1, that is, one would have to determine if the promotion is tissue specific or constitutive, for example, or if it is an inducible promoter, and under what circumstances it is induced or repressed in order to make use of the claimed plants. Each of these determinations is highly unpredictable, from the determination as to whether or not SEQ ID NO: 1 or its complement is in fact a promoter to the determination of the type of promoter it may be to the determination of fragments of the promoter that confer promotion activity.

No specific function of the polypeptide encoded by SEQ ID NO: 1 has been provided, nor has it been demonstrated that SEQ ID NO: 1 has any utility as a marker for a specific phenotypic trait. There has been no specific assertion that in fact SEQ ID NO: 1 is a promoter, aside from the claims. The specification has not provided any guidance as to the use of SEQ ID NO: 1 as a promoter. Utilities that require or constitute carrying out further research to identify or reasonably confirm a "real world" context of use are not substantial utilities, and this is particularly the case with regard to correlation with phenotypic traits or genetic mapping of phenotypic traits. Further, the use of the instantly disclosed polynucleotides to produce the protein encoded by the nucleic acid is not a specific or substantial utility since there is no known utility for the polypeptide. The use of instant SEQ ID NO: 1 as a promoter is not a specific or substantial utility since further experimentation would be required to confirm that in fact SEQ ID NO: 1 has the ability to cause the production of an mRNA molecule and the conditions under which such activity occurs. Thus, no utility has been described for the transformed plant cells

and transgenic plants comprising SEQ ID NO: 1, either as a promoter or as a structural nucleic acid encoding a protein. The specification has provided not information as to what effect the expression of SEQ ID NO: 1 in a transgenic plant would have on the plant. After further research, a specific and substantial credible utility might be found for the claimed cells and plants. This further characterization, however, is part of the act of invention and until it has been undertaken, Applicant's invention is incomplete.

As noted by Brenner v. Manson, 383 U.S. 519, 535-536 (1996), "Congress intended that no patents be granted on a chemical compound whose sole "utility" consists of its potential role as an object of use-testing...a patent is not a hunting license. It is not a reward for the search, but compensation for its successful conclusion." Neither the specification as filed nor any art of record discloses or suggests any property or activity for the claimed cells and plants such that another non-asserted utility would be well established for the compounds.

For these reasons, the claimed host cells and transgenic plants are not supported by either a specific and substantial asserted utility or a well established utility. Note, because the claimed invention is not supported by a specific and substantial asserted utility for the reasons set forth above, credibility has not been assessed.

Claim Rejections - 35 USC § 112, 1st paragraph

10. The following is a quotation of the first paragraph of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 1-3, 5-7, 9, and 10 are also rejected under 35 U.S.C. 112, first paragraph. Specifically, since the claimed invention is not supported by either a specific and substantial asserted utility or a well established utility for the reasons set forth above, one skilled in the art clearly would not know how to use the claimed invention.

For all the above reasons, the disclosure is insufficient to teach one of skill in the art how to use the invention. A review of *In re Wands*, 8 USPQ2d 1400 (CAFC 1988) clearly points out the factors to be considered in determining whether a disclosure would require undue experimentation and include (1) the quantity of experimentation necessary, (2) the amount of direction or guidance presented, (3) the presence or absence of working examples, (4) the nature of the invention, (5) the state of the prior art, (6) the relative skill of those in the art, (7) the predictability or unpredictability of the art and, (8) the breadth of the claims. All of these factors are considerations when determining the whether undue experimentation would be required to use the claimed invention. As is evidence in the discussions *supra*, each of these factors has been carefully considered in the instant grounds of rejection, and it is maintained that undue experimentation would be required by the skilled artisan to use the instant invention.

Claim Rejections - 35 USC § 102

11. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

12. Claims 3, 5, 6, 7, 9, and 10 rejected under 35 U.S.C. 102(b) as being anticipated by Tanksley et al. (US 5648599).

Tanksley et al teach a transformed plant cell and transformed plants comprising said cells, wherein said cells comprise an exogenous promoter, a structural gene, and a termination sequence (see the claims, for example). These claims are anticipated by Tanksley et al. insofar as they require only a "fragment" of SEQ ID NO: 1 to be present in the constructs comprised in the plants or cells. A "fragment" can be as little as one nucleotide or one encoded amino acid, and since the transgenic plants and cells taught by Tanksley et al. comprise constructs having at least this much of instant SEQ ID NO: 1 or encoding a polypeptide with at least one amino acid in common with that encoded by instant SEQ ID NO: 1, the teachings of Tanksley et al. anticipate the claimed invention. Tanksley et al. further teach both monocot transformed plants and dicot transformed plants (see the claims, for example).

Double Patenting

13. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970);and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

14. Claims 3, 5, 6, 7, 9, and 10 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-9 and 16 of copending Application No. 09/421106. Although the conflicting claims are not identical, they are not patentably distinct from each other because the claims in the '106 application are drawn to nucleic acids which hybridize under specifically recited conditions to and/or comprise SEQ ID NO: 5 as described in the '106 application. SEQ ID NO: 5 in the '106 application is identical to SEQ ID NO: 1 in the instant application. The '106 application does not teach transgenic plants or cells. However, in the portion of the specification of the '106 application that supports the disclosure of SEQ ID NO: 5 therein, the specification teaches constructs which comprise SEQ ID NO: 5 as both a structural gene and a promoter (see page 9 of the specification therein). Thus, it would have prima facie obvious to one of ordinary skill in the art at the time the invention was made to have developed the instantly claimed transgenic plants and cells because this is disclosed as a preferred embodiment in the '106 application.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claim Rejections - 35 USC § 102

15. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.
>
> (f) he did not himself invent the subject matter sought to be patented.

16. The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) do not apply to the examination of this application as the application being examined was not (1) filed on or after November 29, 2000, or (2) voluntarily published under 35 U.S.C. 122(b). Therefore, this application is examined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA § 102(e)).

Claims 3, 5-7, and 9-10 are provisionally rejected under 35 U.S.C. 102(e) as being anticipated by copending Application No. 09/421106 or 09/521640 which have a common inventor with the instant application.

Based upon the earlier effective U.S. filing date of the copending applications, each would constitute prior art under 35 U.S.C. 102(e), if patented. This provisional rejection under 35 U.S.C. 102(e) is based upon a presumption of future patenting of the copending application. Each of these applicantions disclose nucleic acids, vectors, host cells, and transgenic plants which comprise instant SEQ ID NO: 1. In the '106 application, SEQ ID NO: 5 is identical to instant SEQ ID NO: 1. In the '640 application, SEQ ID NO: 141,338 is identical to instant SEQ ID NO 1.

This provisional rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the copending application was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

This rejection may <u>not</u> be overcome by the filing of a terminal disclaimer. See *In re Bartfeld*, 925 F.2d 1450, 17 USPQ2d 1885 (Fed. Cir. 1991).

17. Claims 1-3, 5-7, 9, and 10 are rejected under 35 U.S.C. 102(f) because the applicant did not invent the claimed subject matter.

In light of the previously filed co-pending applications 09/421106 and 09/521640 which both disclose the instantly claimed invention and whose inventive entities both differ from the instant application it appears that the inventive entity in the instant application did not invent the claimed subject matter.

Response to Remarks

The rejections have been modified in light of the instantly pending claims.

Applicant's remarks are addressed insofar as they apply to the instantly pending rejections.

Applicant's remarks with regard to the utility rejection are focused upon utilities of the "claimed nucleic acids." However, the claims are no longer drawn to nucleic acids and instead are drawn to plant cells and transgenic plants which include SEQ ID NO: 1 as a "structural nucleic acid" or as a "promoter." Even still, the utilities set forth by applicant in the specification and in the arguments, (i.e. genetic mapping and the identification of the presence or absence of polymorphisms) are not considered to be specific, substantial and credible utilities. Applicant sets forth that the examiner does not provide any support for the proposition that these utilities are not legal utilities. To the contrary, the examiner set forth in the previous office action that these utilities are not specific to instant SEQ ID NO: 1. That is, these utilities can be applied to a general class of chemical compounds, namely any nucleic acid.

Applicant argues that these utilities are directly analogous to the utilities of a microscope, i.e., the claimed nucleic acid molecules (which there are none now) can be used to locate and

measure nucleic acid molecules. However, a microscope has a real world utility in magnifying any object that is set onto the plate under the objective lens. SEQ ID NO: 1, on the other hand could only be used to examine itself, or nucleic acids very similar to itself, and such an interrogation (in a mapping procedure or to determine if there are polymorphic sites within SEQ ID NO: 1) does not provide an immediately useful benefit. Applicant further sets forth that the use of claimed nucleic acid molecules to detect the presence or absence of polymorphisms or in genetic mapping is no more legally insufficient than using a gas chromatograph to analyze a gas. However, again, like the microscope, this comparison is not equal because while instant SEQ ID NO: 1 can only be used to examine itself, the use of a gas chromatogram is general to any gas. Furthermore, it is noted that applicant is setting forth arguments concerning the detection of polymorphism as if polymorphism within SEQ ID NO: 1 are known. Even if the determination of the presence or absence of polymorphisms within SEQ ID NO: 1 in a plant population were a specific, substantial, and credible utility, this invention could not be practiced based on the teachings of the instant specification without further research because no polymorphism within SEQ ID NO: 1 are disclosed.

Applicant argues that the nucleic acid of SEQ ID NO: 1 provides a specific benefit to the public, but for the reasons of record the examiner does not agree. Furthermore, as previously noted, the claims are no longer drawn to nucleic acids but to particular cells and plants that comprise SEQ ID NO: 1 in particular positions in expression constructs. For the reasons discussed in the rejection, these are not considered to have a specific, substantial and credible asserted utility, or a well established utility.

Conclusion

18. No claims are allowed.

19. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Juliet C. Einsmann whose telephone number is (703) 306-5824. The examiner can normally be reached on Monday through Friday, from 9:00 AM until 4:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, W. Gary Jones can be reached on (703) 308-1152. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 308-4242 and (703) 305-3014.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0196.

Juliet C. Einsmann
Examiner
Art Unit 1655

October 4, 2002

W. Gary Jones
Supervisory Patent Examiner
Technology Center 1600